

Please amend the claims as follows:

1-13. Cancelled.

14. (Previously Presented) A method for preparing dispersions of calcium phosphate platelets, wherein the length of the platelets,  $L$ , is between 5 and 500 nm and the thickness of the platelets is between 0.5 and 20 nm, and at least one polymer which complexes calcium comprising the steps of:

- i) preparing a solution of calcium salts; and adjusting the pH to a selected value of between 4 and 6;
- ii) adding a phosphate solution to the solution obtained in step i) over a period of time of between 30 minutes and 4 hours, so as to obtain a calcium to phosphorus molar ratio of between 1 and 2.5, wherein the pH is maintained constant at the selected value of between 4 and 6 until a calcium phosphate platelet dispersion is formed;
- iii) heat treating the dispersion obtained in step ii) at a temperature of between 50°C and 95°C;
- iv) washing the dispersion obtained in step iii);
- v) adding a dispersion agent to the dispersion obtained in step iv);
- vi) separating the colloidal dispersion obtained in step v);

wherein in at least one of steps i) or ii), the solutions further comprise ammonium ions; and wherein at least one polymer which complexes calcium is added during step i) or ii).

15. (Previously Presented) The method according to claim 14, wherein the calcium solution is a  $\text{CaCl}_2$  or  $\text{Ca}(\text{NO}_3)_2$  solution.

16. (Previously Presented) The method according to claim 14, wherein the concentration of the calcium solution is between 0.25M and 2.5M.

17. (Previously Presented) The method according to claim 14, wherein the phosphate salt solution is a solution of one of ammonium phosphate or sodium phosphate.

18. (Previously Presented) The method according to claim 14, wherein the calcium to phosphorus molar ratio in the solution of step ii is between 1.3 and 1.7.

19. (Previously Presented) The method according to claim 14, wherein the temperature of the heat treatment in step iii) is between 60°C and 90°C.

20. (Cancelled)